Summary of the 203 Events:

Tau candidates

Charm candidates

ν_μ CC events
- -spectrum
- -vertex distribution
- -total energy

Classification of all interactions

Background from scattering
- -Small angle
- -Large angle

τ Candidate Table

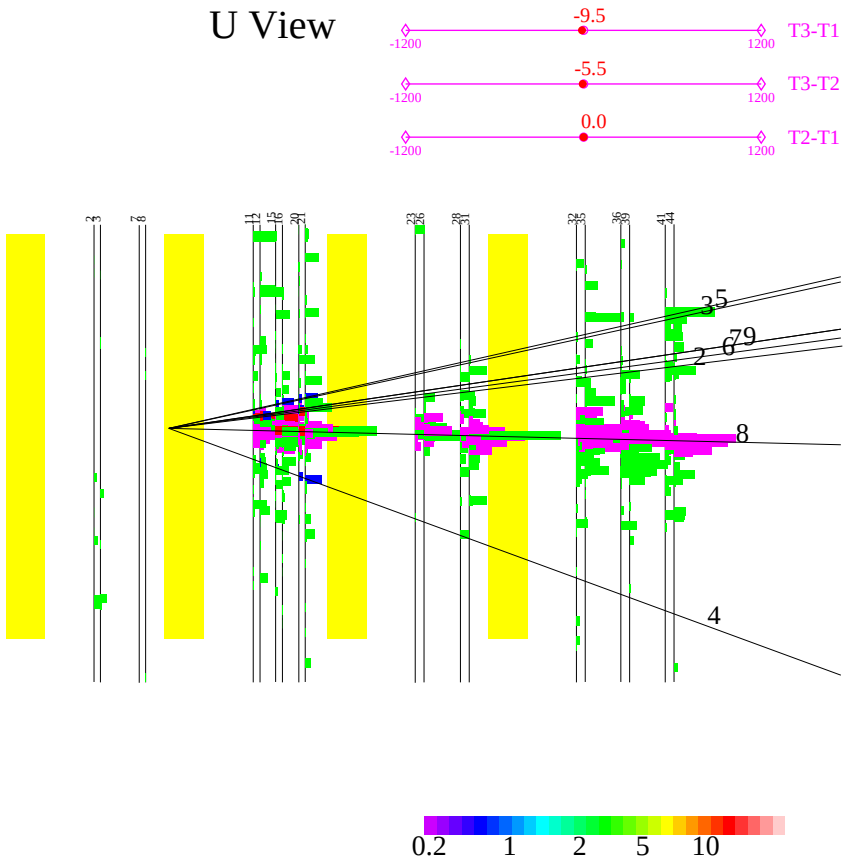
RUN	EVT	MOD	TYP	n_p	θ_{lep}	Δz	θ_d	p_d	Δϕ	P(τ)	P(*scat*)
3024	30175	1/3	E200	4	0.025	4.4	0.093	4.8	5.3		
3039	01910	1/3	E200	5	0.065	0.25	0.090	6.0	2.69		
3333	17655	3/4	E200	5	0.009	0.54	0.013	8.6	3.93		
3356	17099	3/4	E200	9	[0.03]	<0.9	>0.026	5.7	[1.73]		
3263	25102	1/4	E800	3	0.172	1.80	0.130	2.0	4.28		
2929	18912					6.0					
3065	03238										
3130	28864					0.36	0.097	0.8			
2811	21998					4.0	0.030				

3333 17665

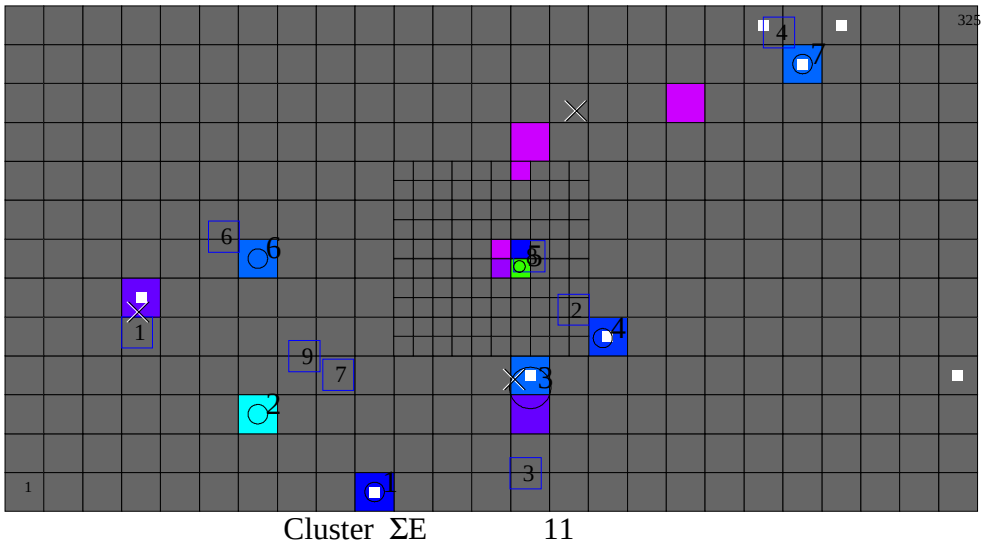
The daughter emulsion track, 8, is clearly an energetic electron, as seen by the shower development in the SFT

In the calorimeter, at the minimum, clusters 5,6, and the energy with track [1] are from this electron. So, the total energy is 6 GeV or more.

The electron penetrates 7.3 X_0 before the lead glass.

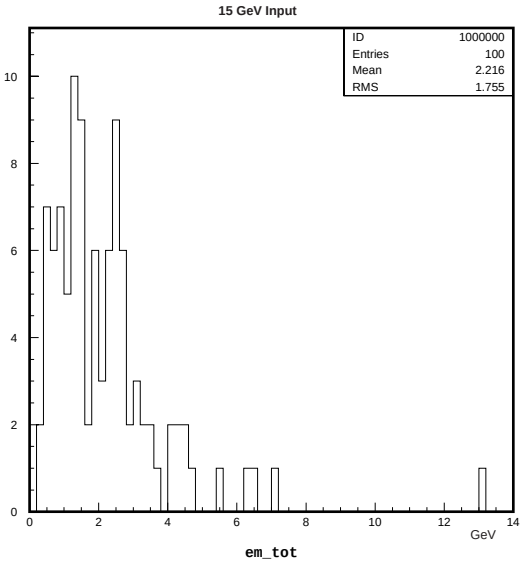


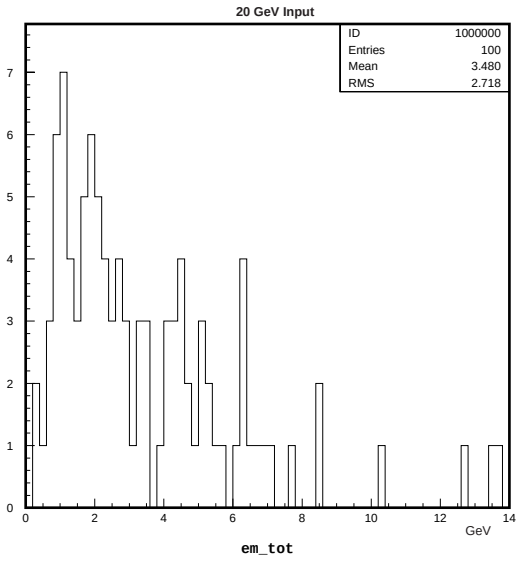
The estimated mean initial energy of an electron which deposits 6 GeV after 7.3 rad lengths is 38 GeV.

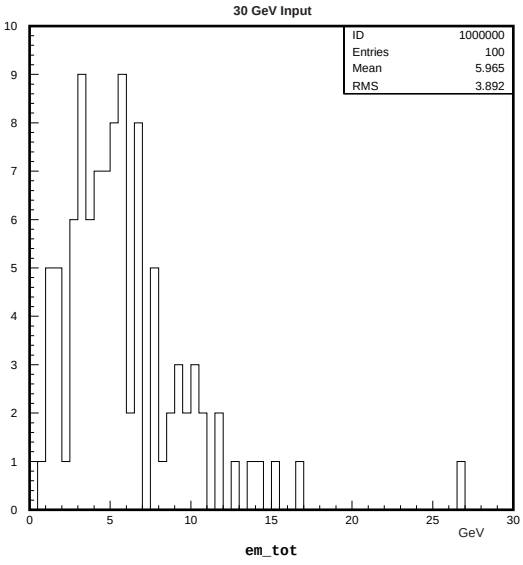


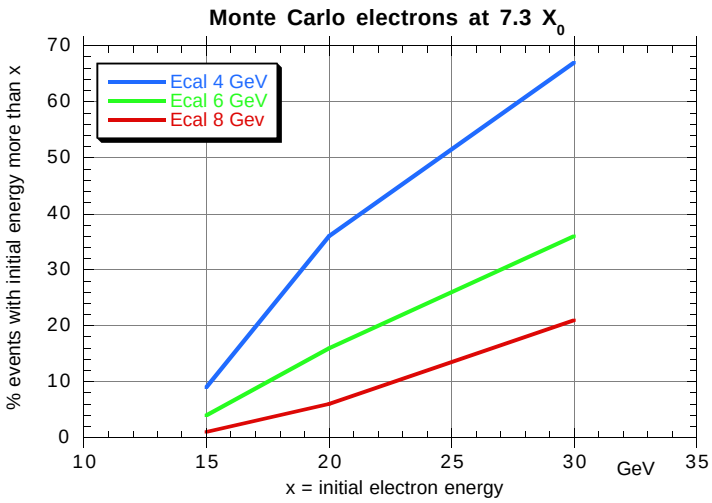
Cluster ΣE 11

1	0.4
2	1.1
3	1.0
4	0.7
5	4.8
6	0.7
7	0.6





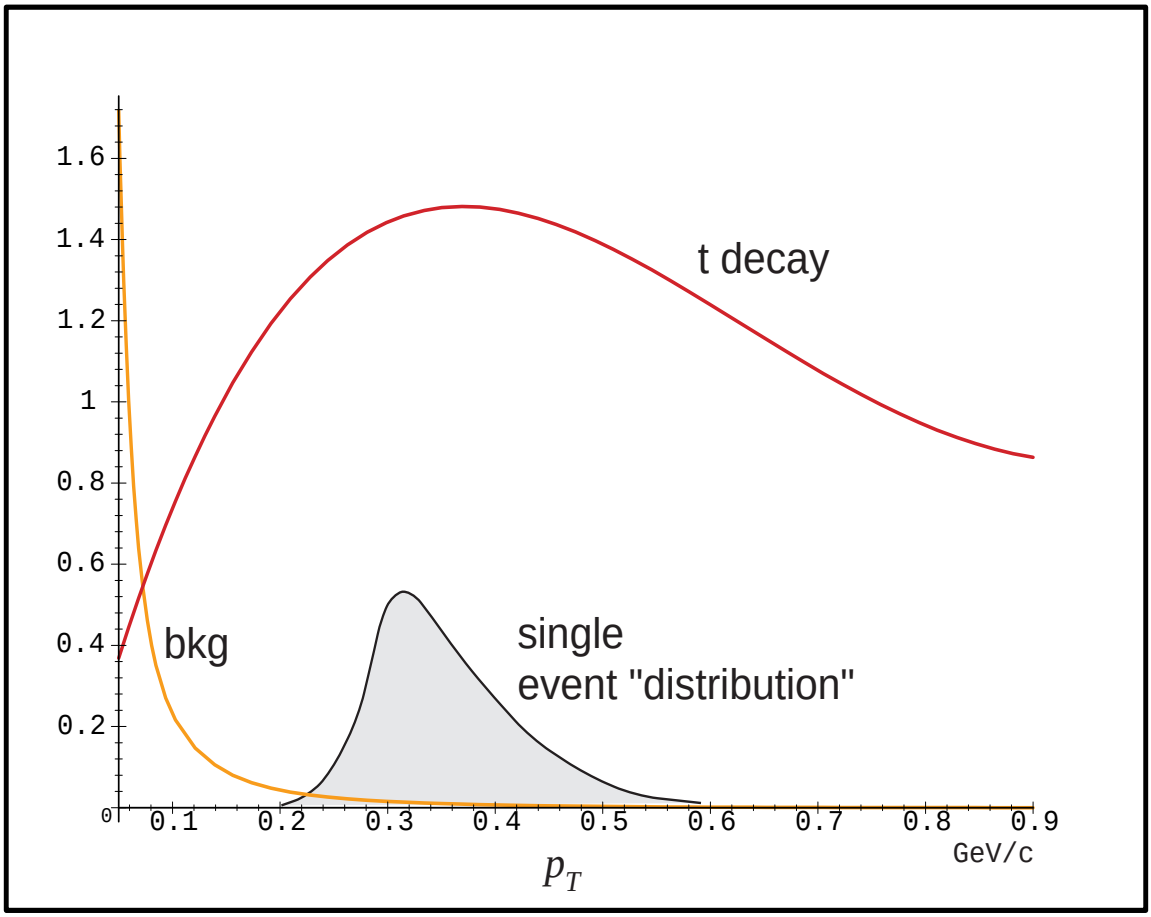




The energy of the daughter electron is estimated from a Monte Carlo study with the initial position fixed at the proper vertex, and the initial energy at 15, 20, 30 GeV. Given that 6 GeV is found in the ecal, the initial energy is > 16 GeV (95% CL). The *expected* initial energy is 38 GeV.

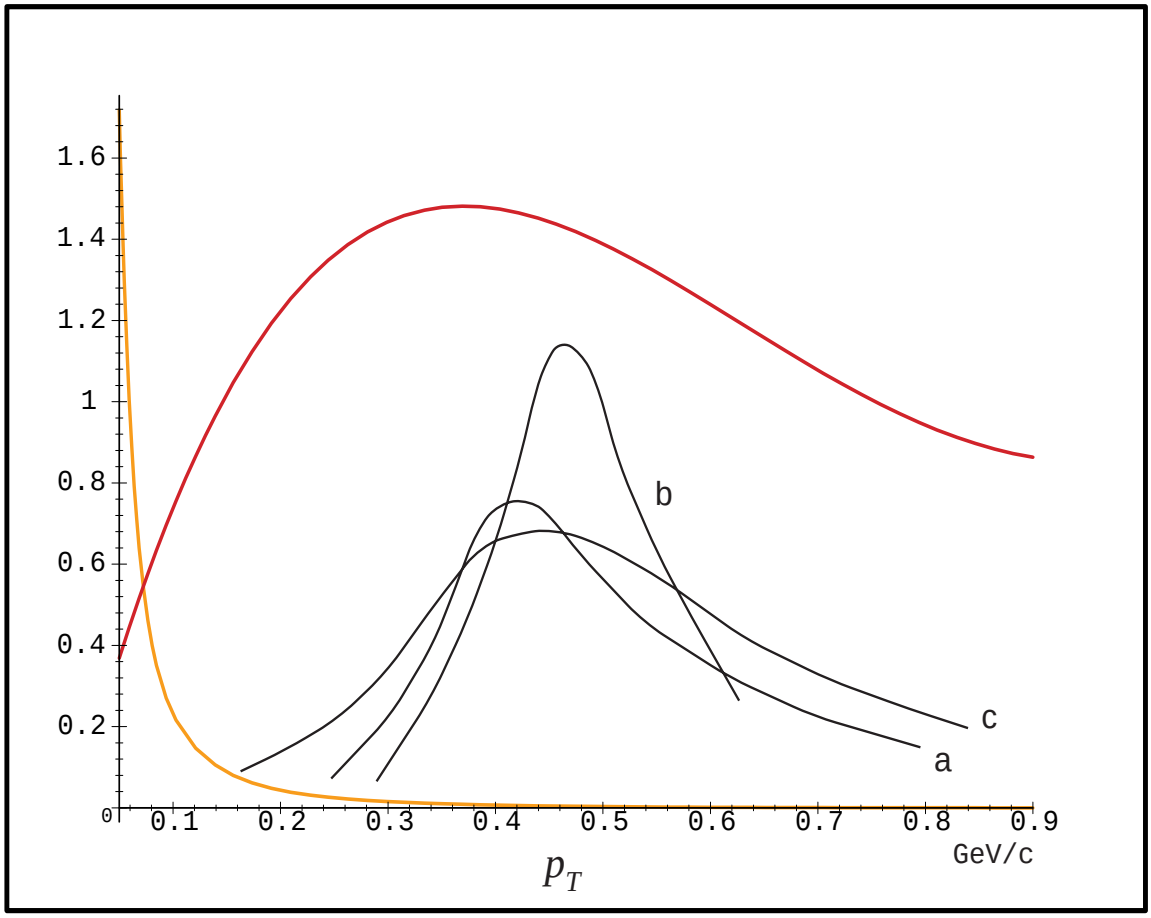
Signal / Background

Requires careful calculation



Background should be calculated event-by-event using error estimates for pT and the functional form of the scattering background. Normalization of this function depends on the material in which the kink is seen.

Preliminary Distributions of the Candidates in Transverse Momentum



(a) 3024 30175
(b) 3039 01910
(c) 3333 17665